

In the Claims:

Please amend claims 1, 3, 4, 6, 7, 9, 17, 19, 20, 22, 23, 25, 33, 35, 36, 38, 39 and 41, and please cancel claims 2, 5, 8, 18, 21, 24, 34, 37 and 40, as indicated below.

1. (Currently amended) A method for accessing a service in a distributed computing environment, comprising:

a client locating a first service within the distributed computing environment, wherein the first service provides a plurality of capabilities to clients executing in the distributed computing environment, wherein the client locating a first service comprises the client receiving an advertisement for the first service, wherein said advertisement describes the plurality of capabilities of the first service;

the client requesting a capability credential to allow the client access to a portion of the first service's capabilities, wherein said requesting a capability credential comprises the client sending a capability credential request message indicating a set of desired capabilities, wherein said capability credential request message comprises an identification of said first service and an indication of the set of desired capabilities, wherein said indication of the set of desired capabilities comprises an indication of said advertisement, and wherein said indication of said advertisement in said capability credential request message is a version of said advertisement edited to describe only said set of desired capabilities;

the client receiving said capability credential, wherein said capability credential indicates that the client has the right to use only said portion of the first service's capabilities, wherein said portion of the first service's capabilities is less than a total of the plurality of capabilities provided by the first service; and

the client using said capability credential to access one or more of said portion of the first service's capabilities.

2. (Canceled)

3. (Currently amended) The method as recited in claim [[2]] 1, wherein said identification of said first service comprises a Universal Unique Identifier (UUID).

4. (Currently amended) The method as recited in claim [[2]] 1, wherein said capability credential request message is formatted in eXtensible Markup Language (XML).

5. (Canceled)

6. (Currently amended) The method as recited in claim [[5]] 1, wherein said indication of said advertisement is said advertisement itself.

7. (Currently amended) The method as recited in claim [[5]] 1, wherein said indication of said advertisement is a Uniform Resource Identifier (URI) to said advertisement.

8. (Canceled)

9. (Currently amended) The method as recited in claim [[5]] 1, wherein said advertisement is a protected advertisement that describes the first service's capabilities but does not provide an interface to the first service's capabilities.

10. (Original) The method as recited in claim 1, further comprising:

the client receiving a protected advertisement for the first service, wherein said protected advertisement indicates an address for sending said capability credential request message to; and

wherein said requesting a capability credential comprises the client sending a capability credential request message to said address indicated in said protected advertisement.

11. (Original) The method as recited in claim 10, wherein said address indicated in said protected advertisement is for an authentication service, wherein said sending a capability credential request message comprises sending said capability credential request message to said authentication service, the method further comprising the authentication service sending a credential request response message to the client in response to said capability credential request message.

12. (Original) The method as recited in claim 11, wherein said credential request response message includes said capability credential, wherein said receiving said capability credential comprises receiving said capability credential from said authentication service in said credential request response message.

13. (Original) The method as recited in claim 1, further comprising:

the client receiving a protected advertisement for the first service, wherein said protected advertisement indicates an authentication service; and

wherein said requesting a capability credential comprises the client requesting a capability credential from said authentication service.

14. (Original) The method as recited in claim 13, the method further comprising:

said authentication service determining a level of the first service's capabilities that the client is authorized to use;

said authentication service generating said capability credential according to said level and said set of desired capabilities; and

said authentication service sending said capability credential to the client, wherein said portion of the first service's capabilities that said capability credential indicates that the client has a right to use is no more than said set of desired capabilities.

15. (Original) The method as recited in claim 14, wherein said portion of the first service's capabilities that said capability credential indicates that the client has a right to use is the lesser of said level of the first service's capabilities that the client is authorized to use and said set of desired capabilities.

16. (Original) The method as recited in claim 1, wherein said using said capability credential to access one or more of said portion of the first services capabilities comprises the client sending a message to the first service to access a first capability, wherein the message includes said capability credential, the method further comprising the first service authenticating said capability credential received in the message to verify that the client has the right to use said first capability.

17. (Currently amended) A client device, comprising:

a connection to a distributed computing environment;

an interface coupled to said connection and configured to locate a first service within the distributed computing environment, wherein the first services provides a plurality of capabilities to clients executing in the distributed computing environment, wherein the interface is configured to receive an

advertisement for the first service, wherein said advertisement describes the plurality of capabilities of the first service;

wherein the interface is further configured to send a capability credential request message over the connection to request a capability credential for a set of desired capabilities to allow a client on the client device access to a portion of the first service's capabilities, wherein said capability credential request message comprises an identification of said first service and an indication of the set of desired capabilities, wherein said indication of the set of desired capabilities comprises an indication of said advertisement, and wherein said indication of said advertisement in said capability credential request message is a version of said advertisement edited to describe only said set of desired capabilities;

wherein the interface is further configured to receive over the connection said capability credential, wherein said capability credential indicates that the client has the right to use only said portion of the first service's capabilities, wherein said portion of the first service's capabilities is less than a total of the plurality of capabilities provided by the first service; and

wherein the interface is further configured to use said capability credential to access one or more of said portion of the first service's capabilities.

18. (Canceled)

19. (Currently amended) The client device as recited in claim [[18]] 17, wherein said identification of said first service comprises a Universal Unique Identifier (UUID).

20. (Currently amended) The client device as recited in claim [[18]] 17, wherein said capability credential request message is formatted in eXtensible Markup Language (XML).

21. (Canceled)

22. (Currently amended) The client device as recited in claim [[21]] 17, wherein said indication of said advertisement is said advertisement itself.

23. (Currently amended) The client device as recited in claim [[22]] 17, wherein said indication of said advertisement is a Uniform Resource Identifier (URI) to said advertisement.

24. (Canceled)

25. (Currently amended) The client device as recited in claim [[21]] 17, wherein said advertisement is a protected advertisement that describes the first service's capabilities but does not provide an interface to the first service's capabilities.

26. (Original) The client device as recited in claim 17, wherein the interface is further configured to receive a protected advertisement for the first service, wherein said protected advertisement indicates an address for sending said capability credential request message to, and wherein the interface is configured to request a capability credential by sending a capability credential request message to said address indicated in said protected advertisement.

27. (Original) The client device as recited in claim 26, wherein said address indicated in said protected advertisement is for an authentication service, wherein said sending a capability credential request message comprises sending said capability credential request message to said authentication service.

28. (Original) The client device as recited in claim 27, wherein the interface is configured to receive said capability credential from said authentication service in a credential request response message.

29. (Original) The client device as recited in claim 17, wherein the interface is further configured to:

receive a protected advertisement for the first service, wherein said protected advertisement indicates an authentication service; and

request a capability credential by requesting a capability credential from said authentication service.

30. (Original) The client device as recited in claim 29, wherein said portion of the first service's capabilities that said capability credential indicates that the client has a right to use is the lesser of said level of the first service's capabilities that the client is authorized to use and said set of desired capabilities.

31. (Original) The client device as recited in claim 17, wherein the interface is configured to use said capability credential to access one or more of said portion of the first service's capabilities for said client by sending a message to the first service to access a first capability, wherein the message includes said capability credential so that the first service may authenticate said capability credential received in the message to verify that the client has the right to use said first capability.

32. (Original) The client device as recited in claim 17, wherein said interface comprises one or more processes executable on a processor within the client device.

33. (Currently amended) A tangible, computer accessible storage medium comprising program instructions, wherein the program instructions are computer-executable on a client device to implement:

locating a first service within the distributed computing environment, wherein the first service provides a plurality of capabilities, wherein locating the first

service comprises receiving an advertisement for the first service, wherein said advertisement describes the plurality of capabilities of the first service;

requesting a capability credential to allow a client on the client device access to a portion of the first service's capabilities, wherein said requesting a capability credential comprises the client sending a capability credential request message indicating a set of desired capabilities, wherein said capability credential request message comprises an identification of said first service and an indication of the set of desired capabilities, wherein said indication of the set of desired capabilities comprises an indication of said advertisement, and wherein said indication of said advertisement in said capability credential request message is a version of said advertisement edited to describe only said set of desired capabilities;

receiving said capability credential, wherein said capability credential indicates that the client has the right to use only said portion of the first service's capabilities, wherein said portion of the first service's capabilities is less than a total of the plurality of capabilities provided by the first service; and

using said capability credential to access one or more of said portion of the first service's capabilities.

34. (Canceled)

35. (Currently amended) The tangible, computer accessible medium as recited in claim [[34]] 33, wherein said identification of said first service comprises a Universal Unique Identifier (UUID).

36. (Currently amended) The tangible, computer accessible medium as recited in claim [[34]] 33, wherein said capability credential request message is formatted in eXtensible Markup Language (XML).

37. (Canceled)

38. (Currently amended) The tangible, computer accessible medium as recited in claim [[37]] 33, wherein said indication of said advertisement is said advertisement itself.

39. (Currently amended) The tangible, computer accessible medium as recited in claim [[37]] 33, wherein said indication of said advertisement is a Uniform Resource Identifier (URI) to said advertisement.

40. (Canceled)

41. (Currently amended) The tangible, computer accessible medium as recited in claim [[37]] 33, wherein said advertisement is a protected advertisement that describes the first service's capabilities but does not provide an interface to the first service's capabilities.

42. (Previously presented) The tangible, computer accessible medium as recited in claim 33, wherein the program instructions are computer-executable on the client device to further implement:

receiving a protected advertisement for the first service, wherein said protected advertisement indicates an address for sending said capability credential request message to; and

wherein said requesting a capability credential comprises the client sending a capability credential request message to said address indicated in said protected advertisement.

43. (Previously presented) The tangible, computer accessible medium as recited in claim 42, wherein said address indicated in said protected advertisement is for an authentication service, wherein said sending a capability credential request message comprises sending said capability credential request message to said authentication service.

44. (Previously presented) The tangible, computer accessible medium as recited in claim 43, wherein said receiving said capability credential comprises receiving said capability credential from said authentication service in a credential request response message.

45. (Previously presented) The tangible, computer accessible medium as recited in claim 33, wherein the program instructions are computer-executable on the client device to further implement:

receiving a protected advertisement for the first service, wherein said protected advertisement indicates an authentication service; and

wherein said requesting a capability credential comprises the client requesting a capability credential from said authentication service.

46. (Previously presented) The tangible, computer accessible medium as recited in claim 45, wherein said portion of the first service's capabilities that said capability credential indicates that the client has a right to use is the lesser of said level of the first service's capabilities that the client is authorized to use and said set of desired capabilities.

47. (Previously presented) The tangible, computer accessible medium as recited in claim 33, wherein said using said capability credential to access one or more of said portion of the first services capabilities comprises the client sending a message to the first

service to access a first capability, wherein the message includes said capability credential so that the first service may authenticate said capability credential received in the message to verify that the client has the right to use said first capability.